TABLE 13. Total and female doctorate recipients, by major field of study: 1999 and 2009

Field of study	1999 ^a		2009 ^b		Change in
	All doctorate recipients	% female	All doctorate recipients	% female	percentage to females
Life sciences	8,174	44.6	11,392	54.5	9.9
Agricultural sciences/natural resources	1,211	28.9	1,280	43.7	14.8
Biological/biomedical sciences	5,564	43.0	8,020	52.2	9.2
Health sciences	1,399	64.3	2,092	70.1	5.7
Physical sciences	6,196	23.3	8,318	29.5	6.1
Chemistry	2,125	29.7	2,392	37.4	7.6
Computer and information sciences	849	18.5	1,610	21.8	3.3
Earth, atmospheric, and ocean sciences	720	25.7	877	38.5	12.8
Mathematics	1,080	25.6	1,551	31.1	5.5
Physics and astronomy	1,422	13.6	1,888	20.3	6.8
Social sciences	7.267	54.7	7,834	58.4	3.7
Anthropology	462	56.7	503	61.2	4.5
Economics	923	27.3	1,120	34.2	6.9
Political science	652	33.1	682	40.0	6.9
Psychology	3,659	67.0	3,471	71.4	4.5
Sociology	543	59.9	664	60.4	0.5
Other social sciences	1,028	59.9 45.7	1,394	52.4	6.6
Engineering	5,294	14.9	7,629	21.3	6.4
Aerospace/aeronautical engineering	205	8.3	295	13.9	5.6
Chemical engineering	575	17.6	808	26.7	9.2
Civil engineering	506	15.0	708	20.9	5.9
Electrical/electronics engineering	1,225	9.6	1,694	15.3	5.7
Industrial/manufacturing engineering	211	19.9	252	26.2	6.3
Materials science engineering	390	19.2	622	25.1	5.8
Mechanical engineering	780	10.9	1,094	13.9	3.0
Other engineering	1,402	19.7	2,156	27.1	7.4
Education	6,536	64.2	6,530	66.9	2.7
Education administration	2,044	60.2	2,149	61.1	0.9
Education research	2,726	67.4	2,656	69.4	1.9
Teacher education	292	69.2	338	71.6	2.4
Teaching fields	890	59.6	902	69.5	10.0
Other education	584	68.0	485	71.1	3.2
Humanities	5,182	48.3	4,898	51.9	3.5
Foreign language and literature	625	61.1	602	62.6	1.5
History	1,010	39.5	1,045	41.9	2.4
Letters	1,513	58.3	1,413	62.9	4.6
Other humanities	2,034	41.4	1,838	45.5	4.1
Other non-S&E fields ^c	2,277	41.0	2,927	48.5	7.5
Business and management	1,102	31.1	1,403	37.9	6.8
Communication	378	52.1	626	58.0	5.9
Fields not elsewhere classified	796	49.4	898	58.5	9.1
Unknown field	1	0.0	0	0.0	na

na = not applicable; no female doctorate recipients in either year.

NOTE: Major field of study definitions are detailed in appendix A.

SOURCE: NSF/NIH/USED/USDA/NEH/NASA, 2009 Survey of Earned Doctorates.

^a 1999 field total excludes 172 individuals for whom sex was not reported.

^b 2009 field total excludes 34 individuals for whom sex was not reported.

^c Includes one unknown field in 1999.